

Polypharmacy in older patients with cancer

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Background

Polypharmacy is associated with drug–drug interactions, adverse drug events, hospitalization, increased mortality and rising costs. Older cancer patients are potentially vulnerable to polypharmacy because cancer treatment often involves exposure to chemotherapy and other adjunctive or supportive medication. Furthermore, the majority of elderly patients with cancer have pre-existing medical conditions requiring pharmacotherapy. This study allowed us to characterize the drugs administered to elderly patients undergoing chemotherapy treatments and to investigate the prevalence of polypharmacy.

Method

This was an observational and transversal study of older cancer patients admitted to three different medical centres of both genders aged > 65 years old undergoing chemotherapy treatments. The medication review included patient self-report and medical records. This study included 559 elderly patients. Mean age was 71.9 years (SD = 0.2). 44 % were women. Mean number of medications reported was 5. The total number of medications used for the 559 patients was 2699, 58 % of them corresponding to drugs administered out of cancer treatment contexts.

Results

When analysed individually, the most prescribed drugs were Proton Pump Inhibitors (261/559; 47 %); HMG CoA reductase inhibitors (161/ 559; 29 %); Anxiolytics, Benzodiazepine derivatives (149; 27 %); Drugs for Functional Gastrointestinal Disorders, Propulsives (106/559; 19 %) and Analgesics and Antipyretics, Anilides (96/559; 17 %). The prevalence of polypharmacy (> = 5 medications) was 48 %.

Conclusions

Polypharmacy is prevalent in older people with cancer. A careful assessment of the medication used in older patients needs to be part of the routine evaluation to minimize risks associated with polypharmacy. However, more research is needed to identify strategies to simplify patients' medication regimens.

Keywords Elderly patients, older patients, polypharmacy, cancer, chemotherapy